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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/728,756	12/04/2000	Richard F. Bergen	D/01	2366

7590                    11/20/2002

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[REDACTED] EXAMINER

HARRINGTON, ALICIA M

ART UNIT	PAPER NUMBER
2873	

DATE MAILED: 11/20/2002

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	Application No.	Applicant(s)	
	09/728,756	BERGEN, RICHARD F.	
	Examiner Alicia M Harrington	Art Unit 2873	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

#### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) Responsive to communication(s) filed on 28 February 2002.
- 2a) This action is FINAL.                    2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) Claim(s) 1-40 is/are pending in the application.
- 4a) Of the above claim(s) 6,7,15,22,23,25-29 and 32-35 is/are withdrawn from consideration.
- 5) Claim(s) \_\_\_\_\_ is/are allowed.
- 6) Claim(s) 1-5,8-14,16-21,24,30,31 and 36-40 is/are rejected.
- 7) Claim(s) \_\_\_\_\_ is/are objected to.
- 8) Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on 04 December 2000 is/are: a) accepted or b) objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) The proposed drawing correction filed on \_\_\_\_\_ is: a) approved b) disapproved by the Examiner.  
If approved, corrected drawings are required in reply to this Office action.
- 12) The oath or declaration is objected to by the Examiner.

#### Priority under 35 U.S.C. §§ 119 and 120

- 13) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) All b) Some \* c) None of:  
 1. Certified copies of the priority documents have been received.  
 2. Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.
- 14) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).  
a) The translation of the foreign language provisional application has been received.
- 15) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

#### Attachment(s)

- |   |   |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)                     | 4) <input type="checkbox"/> Interview Summary (PTO-413) Paper No(s). _____. . |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)            | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)   |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____. . | 6) <input type="checkbox"/> Other: _____ .                                    |

**DETAILED ACTION**

***Election/Restrictions***

Applicant's election with traverse of Figure 1 and claims 1-9,20-16,17-21,24,30,31, and 36-40 in Paper No. 4 is acknowledged. The traversal is on the ground(s) that examination would not necessitate additional searching or undue burdening on the Examiner. This is not found persuasive because applicant has neither submitted evidence nor identified such evidence the species are obvious variants.

The requirement is still deemed proper and is therefore made FINAL.

**Claims 6,7,15 and 22 are drawn to a non-elected species and thus are withdrawn from being treated on the merits by the Examiner.**

***Claim Rejections - 35 USC § 102***

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 1,5,10,14,17,21,36, 40 are rejected under 35 U.S.C. 102(b) as being anticipated by Lang (**US 4,344,671**).

Regarding claims 1, 10, 17 and 36, Lang discloses a system for creating a line of light beams using a radiant energy source (10-14) and an altering device (15) where the energy emerges from the altering device to form a line a predetermined plane (see figure 1; col. 2,lines 25-35).

Regarding claims 5, 14, 21 and 40, Lang discloses the altering is a fiber optic rod (see figure 5).

Art Unit: 2873

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in—

- (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effect under this subsection of a national application published under section 122(b) only if the international application designating the United States was published under Article 21(2)(a) of such treaty in the English language; or
- (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that a patent shall not be deemed filed in the United States for the purposes of this subsection based on the filing of an international application filed under the treaty defined in section 351(a).

Claims 1,8,10,16,17,36 are rejected under 35 U.S.C. 102(e) as being anticipated by

Neuberger et al (US 6,005,717).

Regarding claims 1,10,17 and 36, Nueberger et al discloses a system for creating a line comprising a radiant energy source (401) and an altering device (405) where the energy emerges from the altering device to form a line a predetermined plane (see figures 4a-4b; col. 4, lines 35-44; col. 6,lines 18-20; col. 7, lines 5-20).

Regarding claims 8 and 16, Nueberger discloses the line can be a rectangle to couple light into a fiber.

#### *Claim Rejections - 35 USC § 103*

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 2-4,9,11-13,18-20,24,30,37-39 are rejected under 35 U.S.C. 103(a) as being unpatentable over Neuberger.

Art Unit: 2873

Regarding claims 9,24 and 30 Neuberger disclose the beams can be altered to provide different shapes. Thus, it would have been obvious to one of ordinary skill in the art at the time the invention was made to provide a circle, since circular collections of beams are notoriously well known in the art- the Examiner takes official notice to that fact. Further, Neuberger clearly suggest the output take the form of different shapes in which Neuberger didn't exclude the circle shape.

Regarding claim 2,3,11,12,18,19,37,38, Neuberger designed a tubular shape-altering device. However, Neuberger fail to specifically disclose a hollow tube embodiment. However, the Examiner takes official notice that is well known optical method to use hollow shaped elements (usually with reflective walls) to produce reflection/propagation of light in a light-altering device. Thus, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the tubular figure of Neuberger to include a hollow tube, since it is a well-known optical structure for the propagation of light.

Regarding claim 4, 13, 20 and 39, Neuberger designed a tubular shape-altering device. However, Neuberger fail to specifically disclose a capillary embodiment. However, the Examiner takes official notice that is well known optical method to use hollow shaped elements (usually with reflective walls) to produce reflection/propagation of light in a light-altering device. Thus, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the tubular figure of Neuberger to include a capillary, since a capillary is equivalent in form to a hollow tube. And the use of tubes with openings down the center (like capillary) in the propagation of light is known in the art.

Claim 31 is rejected under 35 U.S.C. 103(a) as being unpatentable over Lang in view of Neuberger.

Regarding claim 31, Lang implements his altering device as a fiber optic rod in one embodiment. The light comes out in a line in plane. However, Neuberger teaches us that the shape of the beam can be changed by altered to produce other patterns. Thus, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Lang to include a circular pattern for output since Neuberger teaches the patterns of lights can be altered to provide several different patterns.

### *Conclusion*

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Anderson (US 5,680,257) discloses light collection optics for spatial light modulation;

Ohe et al (US 5,550,676) discloses a surface light sour element;

Grinberg et al (US 4,871,232) discloses a method and apparatus for ultra high frequency spectrum analysis; and

Rushworth (US 4,309,746) discloses laser seeker target illuminator.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Alicia M Harrington whose telephone number is 703 308 9295. The examiner can normally be reached on Monday - Thursday 9:30-6:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Georgia Epps can be reached on 703 308 4883. The fax phone numbers for the

Art Unit: 2873

organization where this application or proceeding is assigned are 703 308 7724 for regular communications and 703 308 7724 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703 308 0956.

Alicia M Harrington  
Examiner  
Art Unit 2873

AMH   
November 18, 2002



Georgia Epps  
Supervisory Patent Examiner  
Technology Center 2800